

## Competitive Minesweeper Product Backlog

**Problem Statement:** Traditional minesweeper lacks any way to determine better players, or to set up non-random game-play boards. We propose a competitive multiplayer version of minesweeper, in which two players will connect over a network, set up each other's board, and then compete to determine who can get the better score.

**Background Information:** Minesweeper is a simple yet challenging mind game where players are challenged to clear a board without hitting any mines. However, many people are interested in interactive games where they can share the experience with friends. We are attempting to make a version that keeps the simplicity of the traditional minesweeper yet allows players to compete against one another.

**Environment:** We will be using standard desktop Java to develop our application, and no external libraries or databases will be required.

### Functional Requirements:

Backlog ID	Functional Requirements	Hours
1	As a user, I would like to be able to play traditional minesweeper on a generated board	20
2	As a user, I would like to be able to create a minesweeper board	5
3	As a user, I would like to be able to play on a created board	1
4	As as user, I would like to be able to save high scores for a specific board	1
5	As a user, I would like to be able to save a created board for later use	1
6	As a user, I would like to be able to play on multiple board sizes	2

7	As a user, I would like to trade boards with another player	3
8	As a user, I would like to view the other player playing my board while I play theirs	7
9	As a user, I would like to be able to chat with my opponent	5
10	As a user, I would like to be able to see a list of people looking for opponents	10
11	As a user, I would like to be able to select an opponent to challenge	2
	<b>Total</b>	<b>57</b>

**Non-Functional Requirements:** The opponent challenging system should be reliable and quickly connect players together. The high scores should accurately update and not be modifiable.

#### **Case: Play Traditional Minesweeper**

1. Press new game
3. Attempt to clear the board

#### **System Responses**

2. A fresh board appears

#### **Case: Create board**

1. Press Menu> Create board
3. Enter board size
5. Place mines on board
6. Press save board
8. Input board filename

2. A size dialog appears
4. A blank board appears of selected size
7. Save dialog appears
9. Board is saved

#### **Case: Play a created board**

1. Press Menu> Load board
3. Select a board
5. Attempt to clear the board

2. A load dialog appears
4. The loaded board appears, with all spaces blank

#### **Case: Save High Scores**

1. Complete board

2. High Score List appears

4. Input name if necessary

**Case: Trade Boards**

1. Press Menu-> Find a player
3. Select a player
4. Select trade board
6. Select board to trade

**Case: Play with opponent**

1. Press Menu-> Find a player
3. Select a player
4. Select challenge opponent
6. Select board to challenge with

10. Attempt to clear board

3. If new score is high enough, asks for name

5. Save high score

2. Available players are displayed

5. Board selection dialog appears

7. Board trade is initiated

2. Available players are displayed

5. Board selection dialog appears

7. Challenge is initiated

8. Chat box appears

9. View of other player's progress appears